

IN THE DRAWINGS

The attached sheets of drawings includes changes to Figs. 10, 11 and 16. These sheets, which includes Figs. 10, 11 and 16, replace the original sheets including Figs. 10, 11 and 16.

Attachment: Replacement Sheet

REMARKS/ARGUMENTS

Favorable reconsideration of this application as presently amended and in light of the following discussion is respectfully requested.

Claims 8-13 and 16-26 are presently active in this case, Claims 8 having been amended by the present amendment, and Claims 1-7, 14 and 15 having been canceled and replaced by new Claims 18-26 which are respectively identical thereto.

In the outstanding Official Action, Applicants were advised to organize the presentation of claims in the application with the broadest claims being presented earliest. In response, Claims 1-7, 14 and 15 have been canceled and replaced by Claims 18-26 which are respectively identical thereto, whereby the broader Claims 1-7, 14 and 15 are presented earliest consisted with 37 CFR 1.75(g).

In the outstanding Official Action, the title was objected to as being insufficiently descriptive of the claimed invention; Figures 10, 11 and 16 were objected to as requiring the label of --Prior Art--; Claims 8, 9, 11-13 and 16-17 were rejected under 35 USC 102(b) as anticipated by Gill (US patent 6,185,080); Claim 10 was objected to as being dependent upon a rejected based claim but otherwise indicated as including allowable subject matter, and Claims 1-7, 14 and 15 were allowed.

Applicants acknowledge with appreciation the indication of allowable subject matter. Since Applicants consider that amended Claim 8 patentably defines over the cited art, Claim 10 has presently been maintained in dependent form. Also, as above indicated, allowed Claims 1-7, 14 and 15 have been canceled and re-introduced as new Claims 18-26, which are identical to Claims 1-7, 14 and 15 and are thus also allowable.

In response to the objection to the title, the title has been amended consistent with amended Claim 8. Accordingly the objection to the title is believed to have been overcome. If, however, the Examiner disagrees, the Examiner is invited to telephone the undersigned, who will be happy to work with the Examiner to state a mutually acceptable title.

In response to the rejection on the merits, Claim 8 has been amended to clarify the claimed subject matter and thereby more clearly patentably define over the cited prior art. The changes to Claim 8 find support, for example, in FIG. 9 and in the specification at page 32, lines 1-4. No new matter has been added.

Briefly recapitulating, as recited in amended Claim 8, the pinned direction of magnetization of a ferromagnetic layer (P11) included in the first pinned layer (P1) which is in contact with the first spacer layer (S1) is substantially antiparallel to the pinned direction of magnetization of a ferromagnetic layer (P22) included in the second pinned layer (P2) which is in contact with the second spacer layer (S2), as shown in FIG. 9.

The pinned direction of magnetization of each of first to fourth pinned films shown in FIG. 13 of Gill is substantially parallel to each other, as is evident from the description of column 6, line 59 to column 7, line 10 of Gill. In particular, the pinned direction of magnetization of a ferromagnetic layer 217 included in the first pinned layer 216 which is in contact with the first spacer layer 210 is substantially parallel to the pinned direction of magnetization of a ferromagnetic layer 229 included in the second pinned layer 226 which is in contact with the second spacer layer 230. In view of this distinction, it is respectfully submitted that amended Claim 8 and Claims 9-13, 16 and 17 patentably distinguish over Gill.

Similarly, pending Claim 9 recites that one of the first magnetization pinned layer and the second magnetization pinned layer is formed of a single ferromagnetic layer or is formed of a stack of an odd number of ferromagnetic layers and nonmagnetic layers, and the other magnetization pinned layer is formed of a stack of an even number of ferromagnetic layers and nonmagnetic layers. On the other hand, in FIG. 13 of Gill, both of the first pinned layer 216 and the second pinned layer 226 are formed of a stack of an even number of ferromagnetic layers and nonmagnetic layers. Thus, it is respectfully submitted that Claim 9 further patentably distinguishes over Gill.

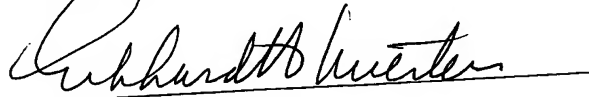
Consequently, in view of the present amendment and in light of the above comments, no further issues are believed to be outstanding and the present application is believed to be

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in condition for formal allowance. An early and favorable action to that effect is respectfully requested.

Respectfully submitted,

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